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UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION 8
999 18TH STREET - SUITE 500
DENVER, CO 80202-2466
<http://www.epa.gov/region08>

Ref: 8EPR-SR

March 27, 2000

Ms. Nancy Willis
Family Star Montessori School
2246 Federal Boulevard
Denver, CO 80211

RE: Soil Sampling at Family Star Montessori School

Dear Ms. Willis:

I am pleased to tell you that EPA has completed the testing of the soil samples collected from the Family Star Montessori School at 1331 East 33rd Avenue, Denver. The soil was tested for arsenic and lead as part of the Vasquez Boulevard/Interstate 70 Superfund Site investigation. We analyzed 90 samples from the property, 30 each from the school yard, the playground, and the vacant lot. The results are reported in parts of arsenic and lead per million parts of soil. Your results are shown in the tables attached to this letter. Maps showing the location of each sample are also attached.

EPA looks at these results to determine whether a cleanup of the soil in the school property is needed. If the results indicate levels greater than 400 arsenic and/or 2,000 lead, the soil will need to be cleaned up.

Your results show that we did not detect arsenic in most samples. Our limit of detection is 11 parts per million. Only 13 samples contained detectable amounts of arsenic in the school yard and playground and these values are only slightly above the detection limit (maximum value was 19). The level of lead is not of concern. Clean up action is not required at the school yard or at the playground. This means that the property is not considered to be part of the Vasquez Boulevard, I-70 Superfund Site.

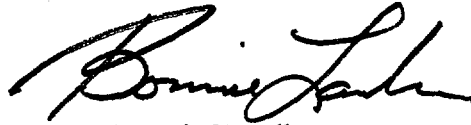
We detected arsenic in one sample on the vacant lot property at a level above 400, indicating that some clean up action is required. EPA is planning to begin clean up activities in May, 2000. We will be contacting you soon with details. If you are concerned, there are things you can do to reduce contact with soil. The enclosed fact sheet describes them. Keeping children away from the soil in the small area where the elevated level of arsenic was detected would be prudent until the clean up work is completed.



Printed on Recycled Paper

Please share these results with the parents of children who attend your school. If you have any questions, please feel free to call me at (303) 312-6579. Thank you for your cooperation in EPA's study.

Sincerely,

A handwritten signature in black ink, appearing to read "Bonnie Lavelle". The signature is fluid and cursive, with the first name "Bonnie" and last name "Lavelle" clearly distinguishable.

Bonnie Lavelle
Remedial Project Manager

attachments

Metals Concentration in Grab Samples Collected at Family Star Montessori Schoolyard

Parameter	Detection Frequency	Average (ppm)	Max (ppm)	Min (ppm)
Arsenic	7/30	12	19	11
Lead	30/30	235	359	127

Grab Sample Results

Sample ID	Arsenic (ppm)	Lead (ppm)
3-06121-B	11	179
3-06122-B	11	157
3-06123-B	11	188
3-06124-B	11	185
3-06125-B	11	202
3-06126-B	11	226
3-06127-B	11	359
3-06128-B	11	257
3-06129-B	11	208
3-06130-B	11	127
3-06131-B	12	136
3-06132-B	11	223
3-06133-B	11	152
3-06134-B	11	216
3-06135-B	11	184
3-06136-B	11	204
3-06137-B	17	347
3-06138-B	11	285
3-06139-B	11	329
3-06140-B	11	331
3-06141-B	11	306
3-06142-B	13	236
3-06143-B	11	296
3-06144-B	11	190
3-06145-B	17	335
3-06146-B	13	283
3-06147-B	11	195
3-06148-B	19	251
3-06149-B	11	230
3-06150-B	11	220

Metals Concentration in Grab Samples Collected at Family Star Montessori Playground

Parameter	Detection Frequency	Average (ppm)	Max (ppm)	Min (ppm)
Arsenic	6/30	11	18	11
Lead	30/30	223	567	61

Grab Sample Results

Sample ID	Arsenic (ppm)	Lead (ppm)
3-06061-B	11	410
3-06062-B	11	525
3-06063-B	11	239
3-06064-B	12	234
3-06065-B	11	135
3-06066-B	11	567
3-06067-B	11	108
3-06068-B	11	256
3-06069-B	11	451
3-06070-B	11	427
3-06071-B	11	136
3-06072-B	18	155
3-06073-B	11	129
3-06074-B	11	324
3-06075-B	11	119
3-06076-B	11	529
3-06077-B	11	170
3-06078-B	11	207
3-06079-B	13	165
3-06080-B	11	102
3-06081-B	11	141
3-06082-B	13	165
3-06083-B	11	98
3-06084-B	11	61
3-06085-B	11	153
3-06086-B	11	118
3-06087-B	14	147
3-06088-B	11	99
3-06089-B	11	137
3-06090-B	11	173

Metals Concentration in Grab Samples Collected at Family Star Montessori Vacant Lot

Parameter	Detection Frequency	Average (ppm)	Max (ppm)	Min (ppm)
Arsenic	14/30	67	1517	11
Lead	30/30	310	1811	88

Grab Sample Results

Sample ID	Arsenic (ppm)	Lead (ppm)
3-06091-B ^a	77	402
3-06092-B	14	307
3-06093-B	11	111
3-06094-B	14	400
3-06095-B	11	298
3-06096-B	23	255
3-06097-B	11	128
3-06098-B	15	219
3-06099-B	11	282
3-06100-B	11	218
3-06101-B	11	182
3-06102-B	19	415
3-06103-B	11	271
3-06104-B	11	282
3-06105-B	11	258
3-06106-B	22	125
3-06107-B	11	146
3-06108-B	11	174
3-06109-B	11	227
3-06110-B	11	88
3-06111-B	19	253
3-06112-B	13	288
3-06113-B	48	1811
3-06114-B	11	309
3-06115-B ^a	1517	404
3-06116-B	11	122
3-06117-B	12	235
3-06118-B	17	517
3-06119-B	20	437
3-06120-B	11	129

^a Sample concentration confirmed by reanalysis; see attached page for reanalysis results

REANALYSIS OF 3 SOILSAMPLES FROM SCHOOLS & PARKS PROGRAM

Date Anal.	Time Anal.	Sample ID #	Param. Sample	Arsenic (ppm)	Lead (ppm)
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2/7/00	1455	3-06422-B	3-06115-B	996	348
2/7/00	1455	3-06427-B	3-06115-B	976	317
2/7/00	1455	3-06423-B	3-06115-B	962	314

MEAN	978	326
STD. DEV.	17.0	19.0
%RSD	2.0	6.0

Date Anal.	Time Anal.	Sample ID #	Param. Sample	Arsenic (ppm)	Lead (ppm)
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2/7/00	1455	3-06426-B	3-06091-B	108	510
2/7/00	1455	3-06425-B	3-06091-B	111	512
2/7/00	1455	3-06430-B	3-06091-B	124	518

MEAN	114	513
STD. DEV.	8.0	4.0
%RSD	7.0	1.0

Project

11/3/70

Contract No.

4994

Sheet

File No.

Feature

Family Star Montessori

Designed

[Signature]

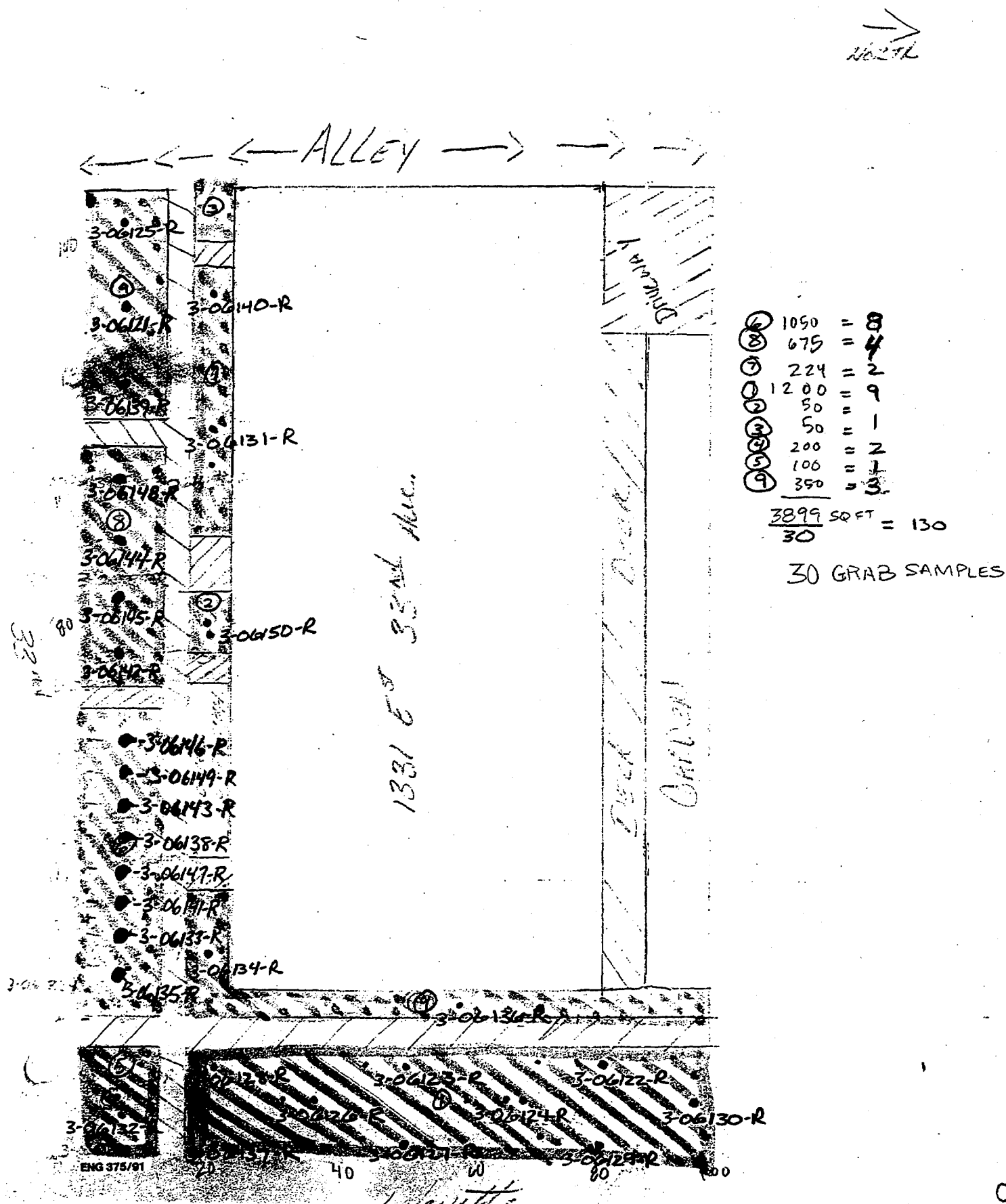
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11/3/99

Item

Checked

Date _____

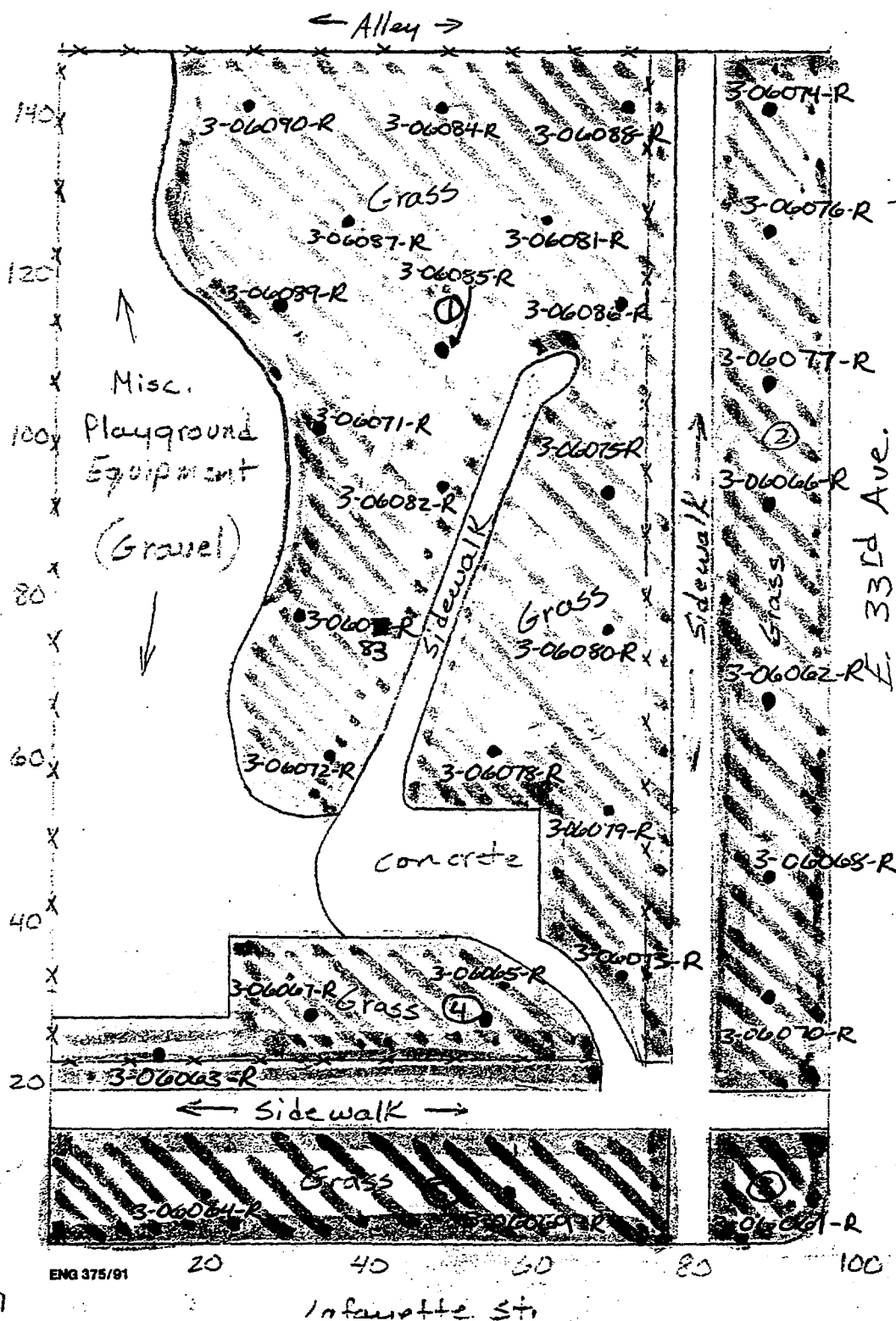




Date _____

← N

160



5700
2250
225
1125
900

10200 SQ FT

30 GRAB SAMPLES

$$\frac{10200}{30} = 340$$

$$\begin{array}{r} \text{Area \#1} = 17 \\ \text{Area \#2} = 7 \\ \text{Area \#3} = 1 \\ \text{Area \#4} = 3 \\ \text{Area \#5} = 2 \\ \hline 30 \end{array}$$

3. *EF* *for* *ATIS/c*



Project

I 70 / VASQUEZ BLVD

Contract No.

4994

Sheet

File No.

Feature

EXPORT LOT FROM CAR MOUNTAIN

Designed

[Signature]

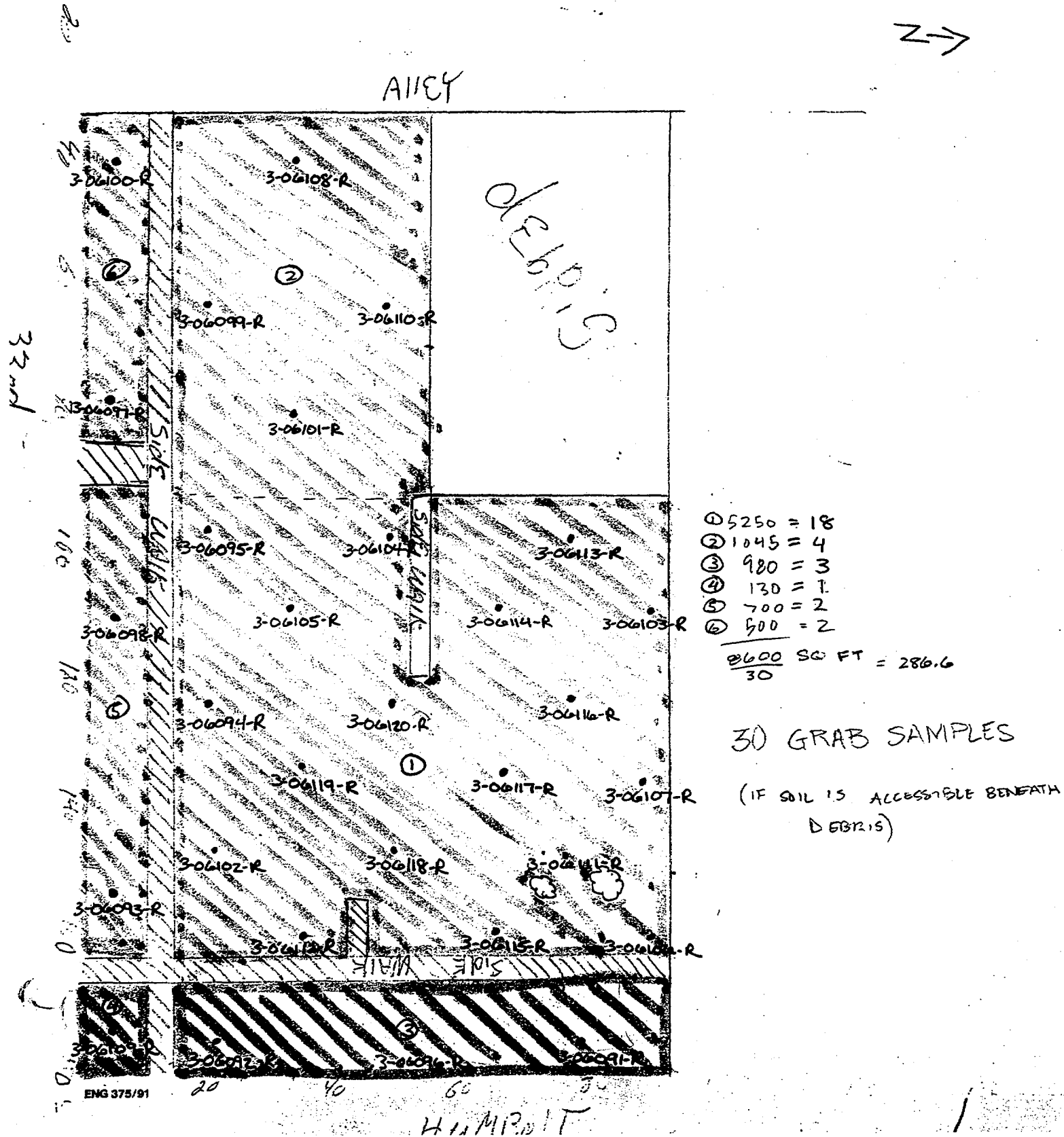
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11-3-99

Item

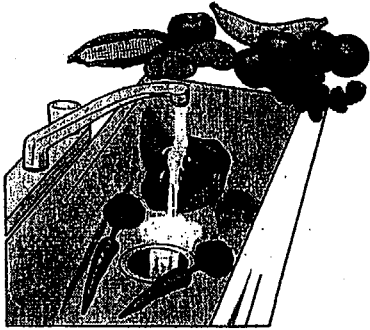
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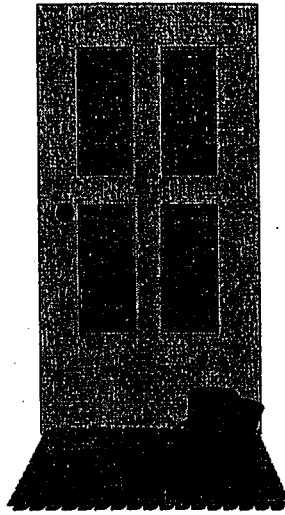


Ways to protect your health

By keeping dirt from getting into your house and into your body



Wash and peel all fruits, vegetables, and root crops



Wipe shoes on doormat or remove shoes



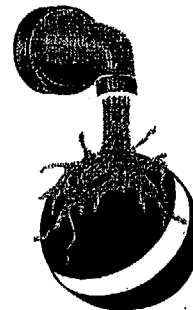
Don't eat food, chew gum, or smoke when working in the yard



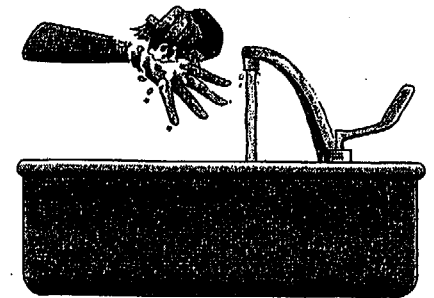
Damp mop floors and damp dust counters and furniture regularly



Wash dogs regularly



Wash children's toys regularly



Wash children's hands and feet after they have been playing outside